Water Management Coordination Team Report Assets for End of Stage I

In-Delta Storage

Webb Tract and Bacon Island

1. Project Description

240 TAF storage capacity
11,000 acres of reservoir
9,000 acres of habitat (Bouldin and Holland)

Reference: Delta Wetlands DEIR/EIS, December 1995

Project Costs

\$779 million estimated capital costs \$10 million estimated annual O&M costs \$236 to \$328 per acre-foot

Reference: CALFED Storage and Conveyance Components, Facility Descriptions and Cost Estimates, October 1997

Timing

DEIR/S completed December 1995, REIR/EIS in January 2000 Water rights hearing held summer 1997, continued hearing in spring 2000 2-3 year construction schedule

Project Benefits

173-240 TAF of additional Delta exports per year
Creation of 240 TAF of new in-Delta storage
Potential salinity benefits from release of low salinity water
Elimination of 92 unscreened ag diversions
Elimination of 56 TAF of foregone ag discharges
Creation of 9,000 acres of wetland and wildlife habitat (Bouldin and Holland)

Reference: DNCT gaming EWA Game 1, Summer 1999
Delta Wetlands DEIR/EIS, December 1995

Assumed Duration of Project Benefits

Benefits are assumed to be permanent

6. Assumed Operational Restrictions

4,000 cfs average monthly diversions
4,000 cfs average monthly discharges
Diversion restrictions October to March for fishery protection
Diversion prohibitions April to May for fishery protection
Discharge restrictions January to July for fishery protection
Additional operational restrictions may be necessary to mitigate for water quality and seepage impacts

Reference:

FWS and NMFS biological opinions, May 1997

DFG revised biological opinion August 1998

Impacts on Others

Potential water quality impact on export TOC levels

Potential seepage impacts to neighboring islands

Potential salinity impacts if high salinity water is diverted to storage

8. [Major] Permits or Other Approvals Needed

Water rights permit to divert and store surplus flows 404 permit to construct levee improvements NMFS and DFG consultation for spring run chinook salmon

9. Procedure for Obtaining Permits and Other Approvals

SWRCB issues water rights permit USACE issues 404 permits FWS, NMFS, and DFG issue biological opinions

10. Implementation Responsibility

Delta Wetlands or project buyer

11. Necessary Cooperating Parties

DWR and USBR for operations involving SWP and CVP facilities Fish and wildlife agencies to monitor the implementation of biological opinions Page 3

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Bacon Connected to Export Pumps

Project Description

4,000 cfs pipeline connection from Bacon to CCFB Requires Bacon Island storage to be in place (see above)

Project Costs

\$218 million estimated capital costs (no new storage) \$1 million estimated annual O&M costs \$94 to \$130 per acre-foot (in addition to Bacon storage costs, see above)

Reference: CALFED Storage and Conveyance Components, Facility Descriptions and Cost Estimates, October 1997

3. Timing

> Feasibility and environmental studies could take 3 to 5 years 2-3 year construction schedule

Project Benefits

108-150 TAF of screened Delta exports per year

Reference: DNCT gaming EWA Game 1, Summer 1999

Assumed Duration of Project Benefits

Benefits are assumed to be permanent

Assumed Operational Restrictions

4,000 cfs capacity

Impacts on Others

Potential impact to landowners between Bacon and CCFB Potential impact to Santa Fe railroad

Potential impact to HWY 4

Potential impact to EBMUD aqueduct

Potential impact to gas pipeline

[Major] Permits or Other Approvals Needed

404 permit to pipeline

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Biological opinions for terrestrial and fishery species Streambed alteration permit for siphons under channels

Procedure for Obtaining Permits and Other Approvals

USACE issues 404 permits FWS, NMFS, and DFG issue biological opinions

Implementation Responsibility

Project proponent

11. Necessary Cooperating Parties

DWR and USBR for operations involving SWP and CVP facilities Fish and wildlife agencies to monitor the implementation of biological opinions

02/09/02

1. Project Description

108 TAF storage capacity (EWA gaming assumed 80 TAF) 8,300 acres of reservoir Assume 6,800 acres of habitat

Reference: CALFED Storage and Conveyance Components, Facility Descriptions and Cost Estimates, October 1997

2. Project Costs

\$666 million estimated capital costs
\$7 million estimated annual O&M costs
\$483 to \$670 per acre-foot

Reference: CALFED Storage and Conveyance Components, Facility Descriptions and Cost Estimates, October 1997

3. Timing

Feasibility and environmental studies could take 3 to 5 years Water rights hearing could be held in 2005 2-3 year construction schedule

4. Project Benefits

70-97 TAF of additional Delta exports per year Creation of 108 TAF of new in-Delta storage Potential salinity benefits from release of low salinity water Elimination of unscreened ag diversions Elimination of foregone ag discharges Creation of 6,800 acres of new wetland and wildlife habitat

Reference: DNCT gaming EWA Game 2, Summer 1999

5. Assumed Duration of Project Benefits

Benefits are assumed to be permanent

6. Assumed Operational Restrictions

4,000 cfs average monthly diversions
4,000 cfs average monthly discharges
Diversion restrictions October to March for fishery protection

Diversion prohibitions April to May for fishery protection No discharge restrictions, directly connected to CCFB

7. Impacts on Others

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Potential water quality impact on export TOC levels
Potential seepage impacts to neighboring islands
Potential salinity impacts if high salinity water is diverted to storage
Potential impact to Caltrans HWY 4
Potential impact to EBMUD aqueduct
Potential impact to gas and WAPA power transmission lines
Additional operational restrictions may be necessary to mitigate for water quality
and seepage impacts

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8. [Major] Permits or Other Approvals Needed

Environmental evaluations (EIR/EIS)
Water rights permit to divert and store surplus flows
404 permit to construct levee improvements
Biological opinions for all species
Streambed alteration permit for siphons under channels

9. Procedure for Obtaining Permits and Other Approvals

SWRCB issues water rights permit USACE issues 404 permits FWS, NMFS, and DFG issue biological opinions

10. Implementation Responsibility

Project proponent

11. Necessary Cooperating Parties

DWR and USBR for operations within SWP and CVP system Fishery and wildlife agencies to implement biological opinions Caltrans for HWY 4 impacts Gas and WAPA for power transmission impacts